USCMS Engineer Status Report for July 2004

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1 Work Performed This Month

I performed the following work during the month of July:

1. Globus RLS study

(1).Continued the work on Globus RLS performance study. Pure RLS client performance was obtained by running the clients twice—once with connecting RLS server, once without. I later modified the bench program from Naveen Palaval at ISI to read the DC04 entries to test the performance of RLS C API. After finishing all the tests, I wrote a report on the performance of Globus RLS. (2).Some time was spent to study how to create/add RLS attributes, conducted some study on MCS(Metadata Catalog Service), EDG Replication Metadata Catalog. (3).With the help from Zhen, I wrote a script to extract FILEID(GUID) from POOL using python API. (4).With the help from Bill, Zhen and Vincenzo, I spent quite some time to study the POOL File Catalog, Collections and how COBRA uses the POOL Catalog. Based on the suggestions by Lothar and many other people, a short proposal was written to use Globus RLS in CMS applications. Carl Kesselman and Ann Chervenak later added LRC into the development and deployment of the proposal.

2. File transfer

(1). Spent some time to read and comment on Tim Barrass's DC04 Post Mortem document; (2).Files were beginning moving into Fermilab, transferred all files assigned to Fermilab; (3).Worked with Jon Bakken and Timur Perelmutov to test the new version of srm server and clients; (4).Began to work on the scripts to output files from FNAL (FNAL as a data source); (5).Continue to monitor the HCAL Testbeam data transfer and solved the

problems encountered sometime. (6). Worked with Hans on testing the srm client on UAF;

3. Others:

(1). Provided some info on Glue Schema to Laurence Field at CERN for interoperation between LCG and Grid3; (2). Handled the copyright forms for the ATAT03 Configuration monitoring paper;

2 Status of Deliverables

1. The proposal to use Globus RLS has been written; 2. Work with the ISI people to connect POOL with Globus RLS, should be done in August—depending on the progress at ISI; 3. Modifying the CERN T0 code to use FNAL as a data source will finish in August;

3 Plans For Next Month

1. I will work on using Globus RLS with CMS applications—using Globus RLS as the POOL backend;

2. Continue to work on modifying the CERN T0 code to output data from Fermilab (using TMDB V1 and V2);

3. Work on the T1 scripts to work with TMDB V2;

4 Longer Term Plans

Need talk with the management.

5 Resources Needed

None.

6 Links To Supporting Documentation

- 1.Initial Report on Globus/ISI RLS investigation and its possible application in CMS:

- http://home.fnal.gov/ yujun/doc/globus_rls_perform_updated_report.PDF
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- 2. Initial proposal for using Globus RLS in CMS applications:
- http://home.fnal.gov/ yujun/doc/globus_rls_proposal.pdf
-
- 3. Ann Chervenak and Carl Kesselman's proposal:
- http://home.fnal.gov/ yujun/doc/ProposalForCMS_ann.PDF